

ABSTRACT

A system and method for simply and reliably determining the location and orientation of a medical device within a patient's body. A medical device, such as a catheter, has bending indicators on or imbedded in its wall, and passes through an anatomical reference of known orientation relative to a target site within the patient. Information from the tube bending indicators permits determination of the orientation of a feature, such as an orifice, at the distal end of the medical device relative to the anatomical reference. From the known orientation of the anatomical reference, and information on the location and orientation of the distal end of the medical device obtained from fluoroscopic imaging from a single direction, the physician may reliably determine the orientation of the distal feature relative to the target site, eliminating the need for imaging from multiple directions.